BLOCK DIAGRAM

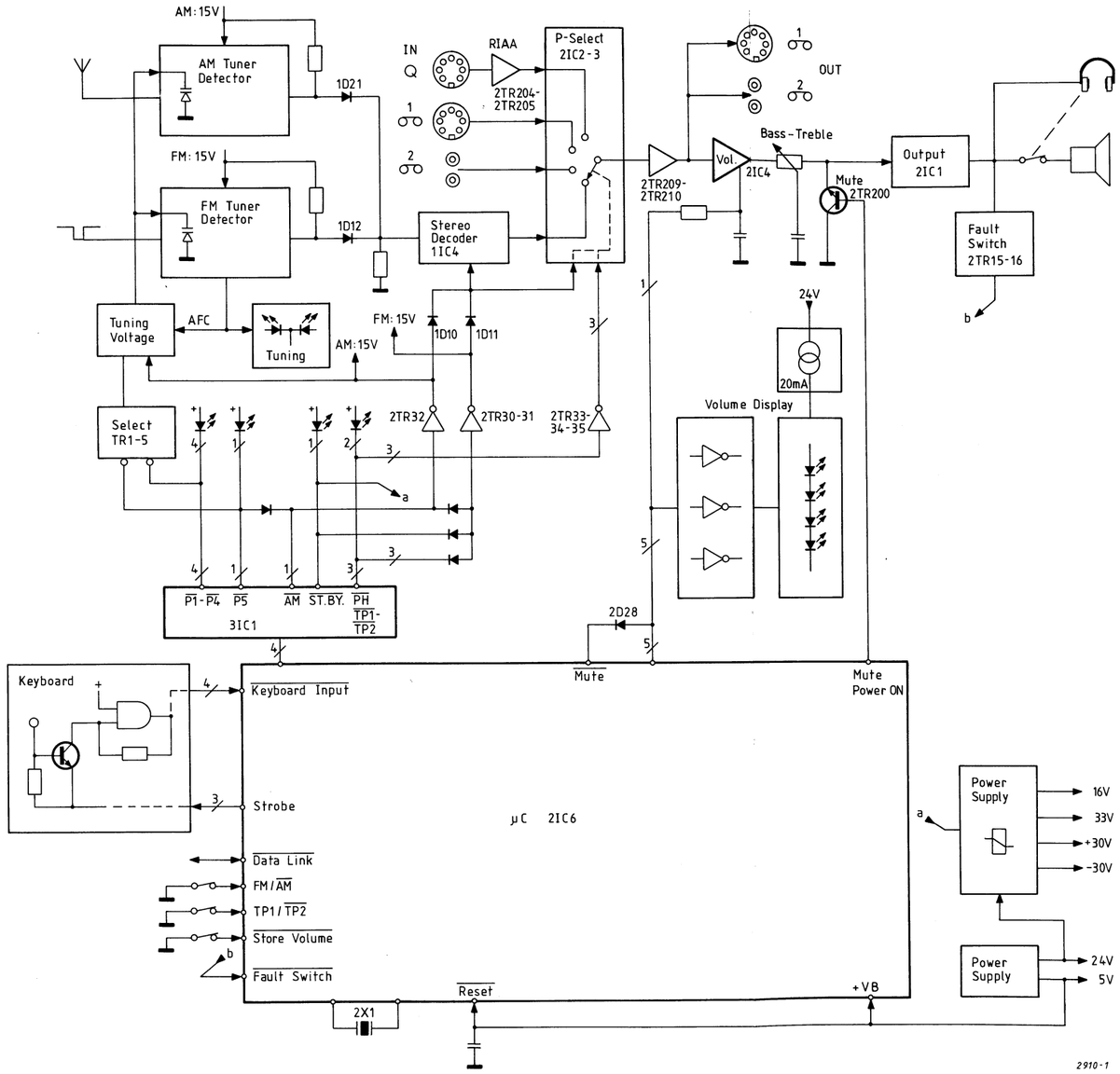


DIAGRAM A, type 2912/15/17 *From serial no. 2930001*

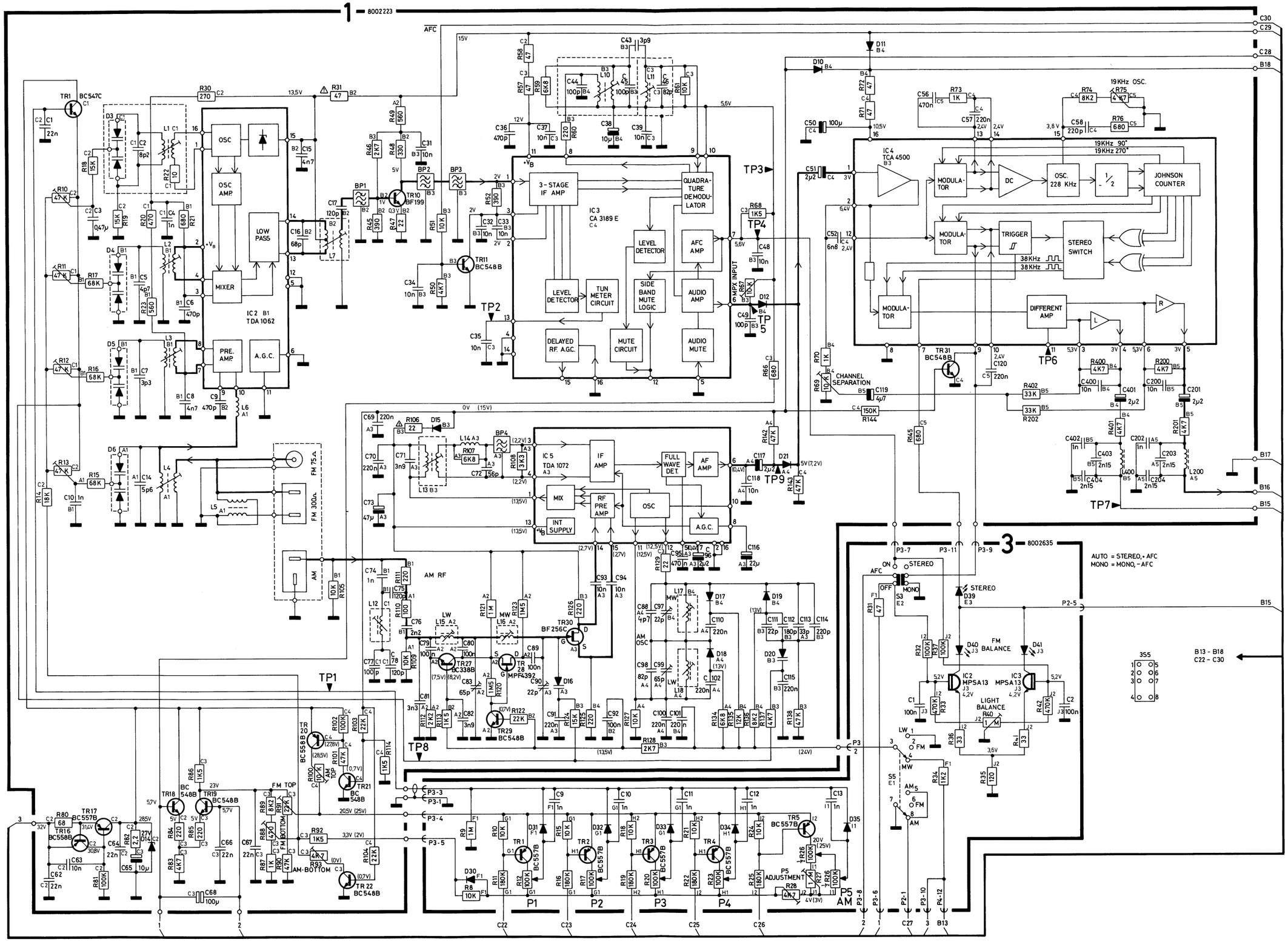


DIAGRAM B, all types

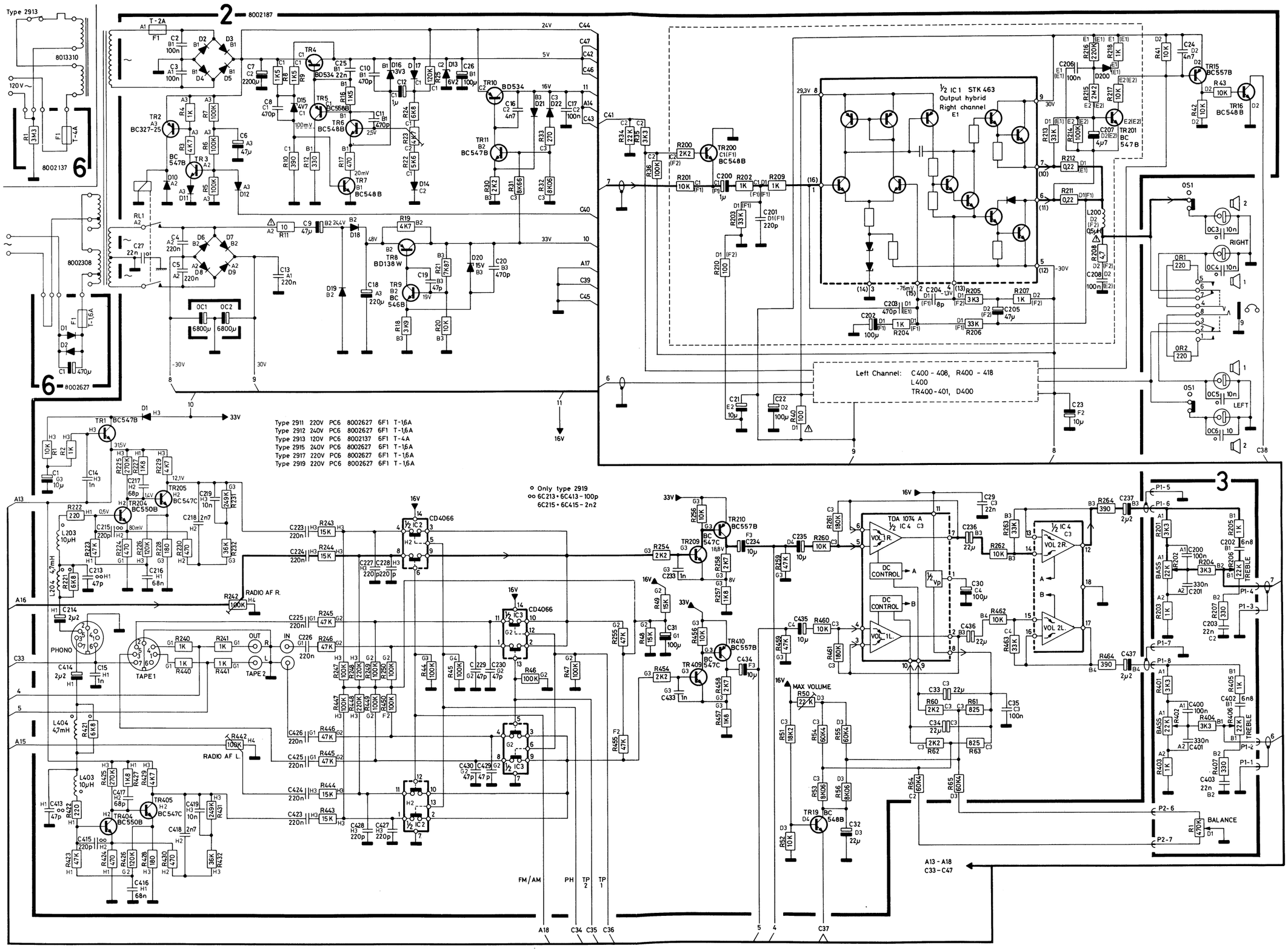
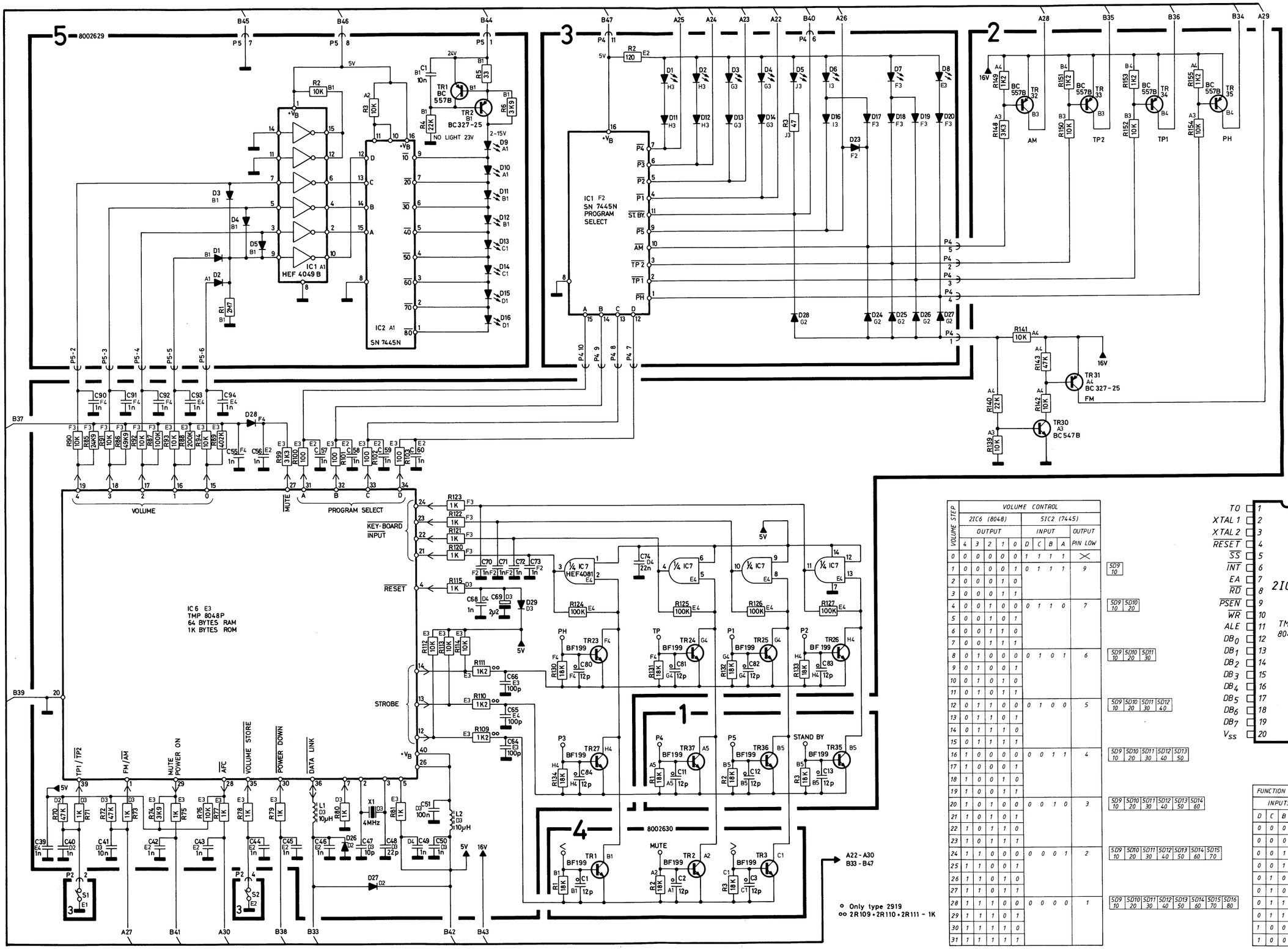


DIAGRAM C, all types



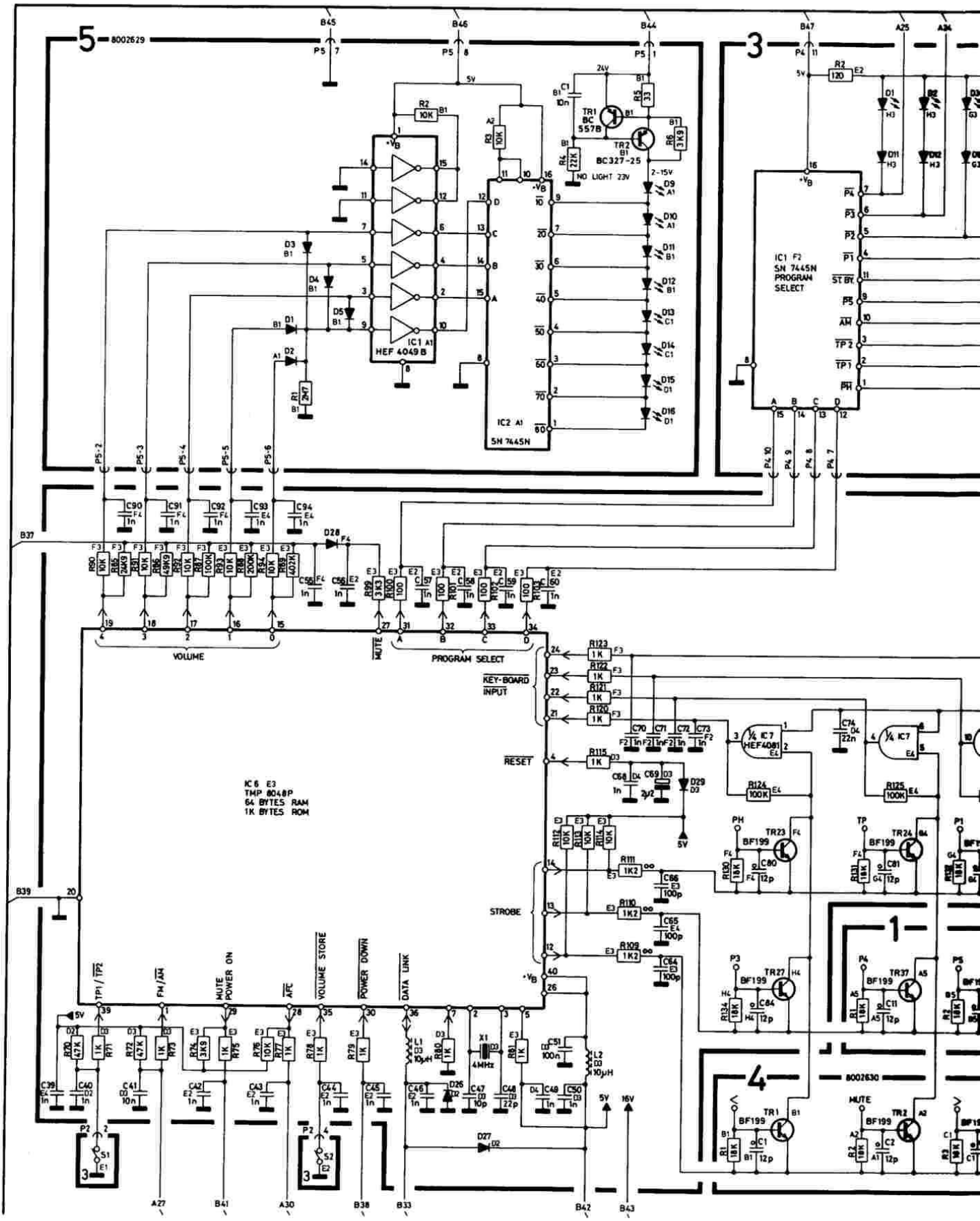
VOLUME STEP	VOLUME CONTROL 2IC6 (8048) OUTPUT 4	3	2	1	0	5IC2 (7445) INPUT D	C	B	A	OUTPUT PIN LOW	
0	0	0	0	0	0	1	1	1	1	X	
1	0	0	0	0	1	0	1	1	1	9	5D9 10
2	0	0	0	1	0						
3	0	0	0	1	1						
4	0	0	1	0	0	0	1	1	0	7	5D9 10 | 5D10 20
5	0	0	1	0	1						
6	0	0	1	1	0						
7	0	0	1	1	1						
8	0	1	0	0	0	0	1	0	1	6	5D9 10 | 5D10 20 | 5D11 30
9	0	1	0	0	1						
10	0	1	0	1	0						
11	0	1	0	1	1						
12	0	1	1	0	0	0	1	0	0	5	5D9 10 | 5D10 20 | 5D11 30 | 5D12 40
13	0	1	1	0	1						
14	0	1	1	1	0						
15	0	1	1	1	1						
16	1	0	0	0	0	0	0	1	1	4	5D9 10 | 5D10 20 | 5D11 30 | 5D12 40 | 5D13 50
17	1	0	0	0	1						
18	1	0	0	1	0						
19	1	0	0	1	1						
20	1	0	1	0	0	0	0	1	0	3	5D9 10 | 5D10 20 | 5D11 30 | 5D12 40 | 5D13 50 | 5D14 60
21	1	0	1	0	1						
22	1	0	1	1	0						
23	1	0	1	1	1						
24	1	1	0	0	0	0	0	0	1	2	5D9 10 | 5D10 20 | 5D11 30 | 5D12 40 | 5D13 50 | 5D14 60 | 5D15 70
25	1	1	0	0	1						
26	1	1	0	1	0						
27	1	1	0	1	1						
28	1	1	1	0	0	0	0	0	0	1	5D9 10 | 5D10 20 | 5D11 30 | 5D12 40 | 5D13 50 | 5D14 60 | 5D15 70 | 5D16 80
29	1	1	1	0	1						
30	1	1	1	1	0						
31	1	1	1	1	1						

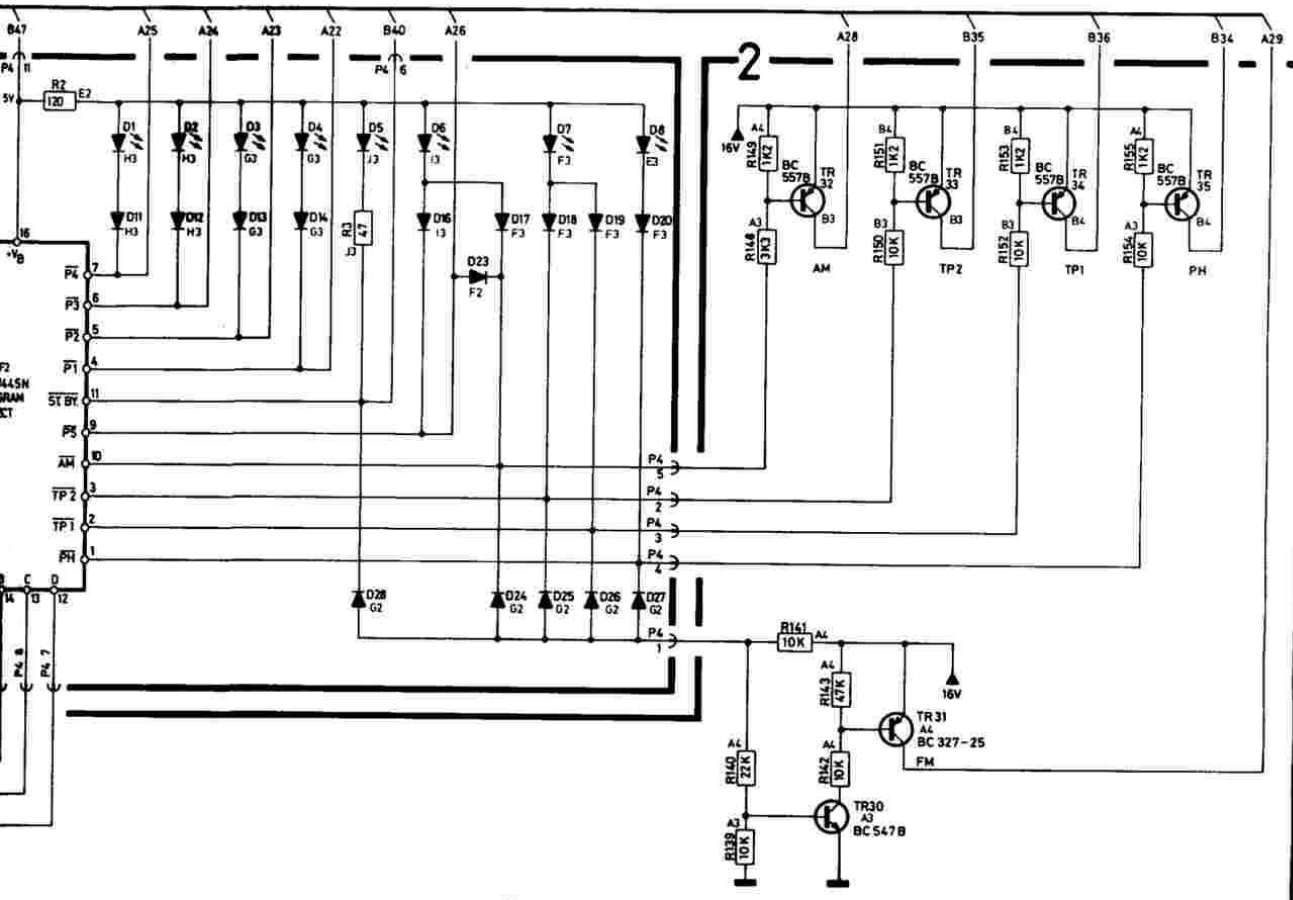
T0	1	40	V_{CC}
XTAL 1	2	39	T1
XTAL 2	3	38	P27
$\overline{RESET}$	4	37	P26
$\overline{SS}$	5	36	P25
$\overline{INT}$	6	35	P24
EA	7	34	P17
$\overline{RD}$	8	33	P16
$\overline{PSEN}$	9	32	P15
$\overline{WR}$	10	31	P14
ALE	11	30	P13
DB_0	12	29	P12
DB_1	13	28	P11
DB_2	14	27	P10
DB_3	15	26	V_{DD}
DB_4	16	25	PROG
DB_5	17	24	P23
DB_6	18	23	P22
DB_7	19	22	P21
V_{SS}	20	21	P20

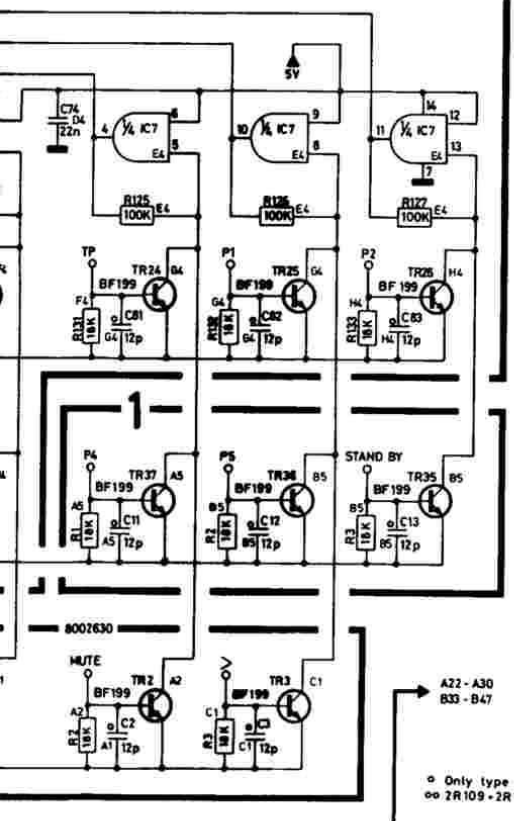
2IC6 TMP 8048

FUNCTION TABLE 3IC1 (7445) INPUTS D	C	B	A	FUNCTION	PIN LOW
0	0	0	0	PHONO	1
0	0	0	1	TAPE 1	2
0	0	1	0	TAPE 2	3
0	0	1	1	AM	4
0	1	0	0	P5	5
0	1	0	1	ST. BY	6
0	1	1	0	P1	7
0	1	1	1	P2	9
1	0	0	0	P3	10
1	0	0	1	P4	11

DIAGRAM C, all types



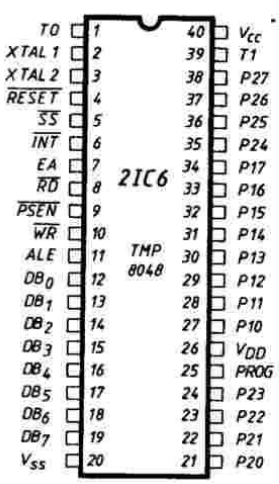




A22 - A30
B33 - B47

o Only type 2919
oo 2R109 + 2R110 + 2R111 = 1K

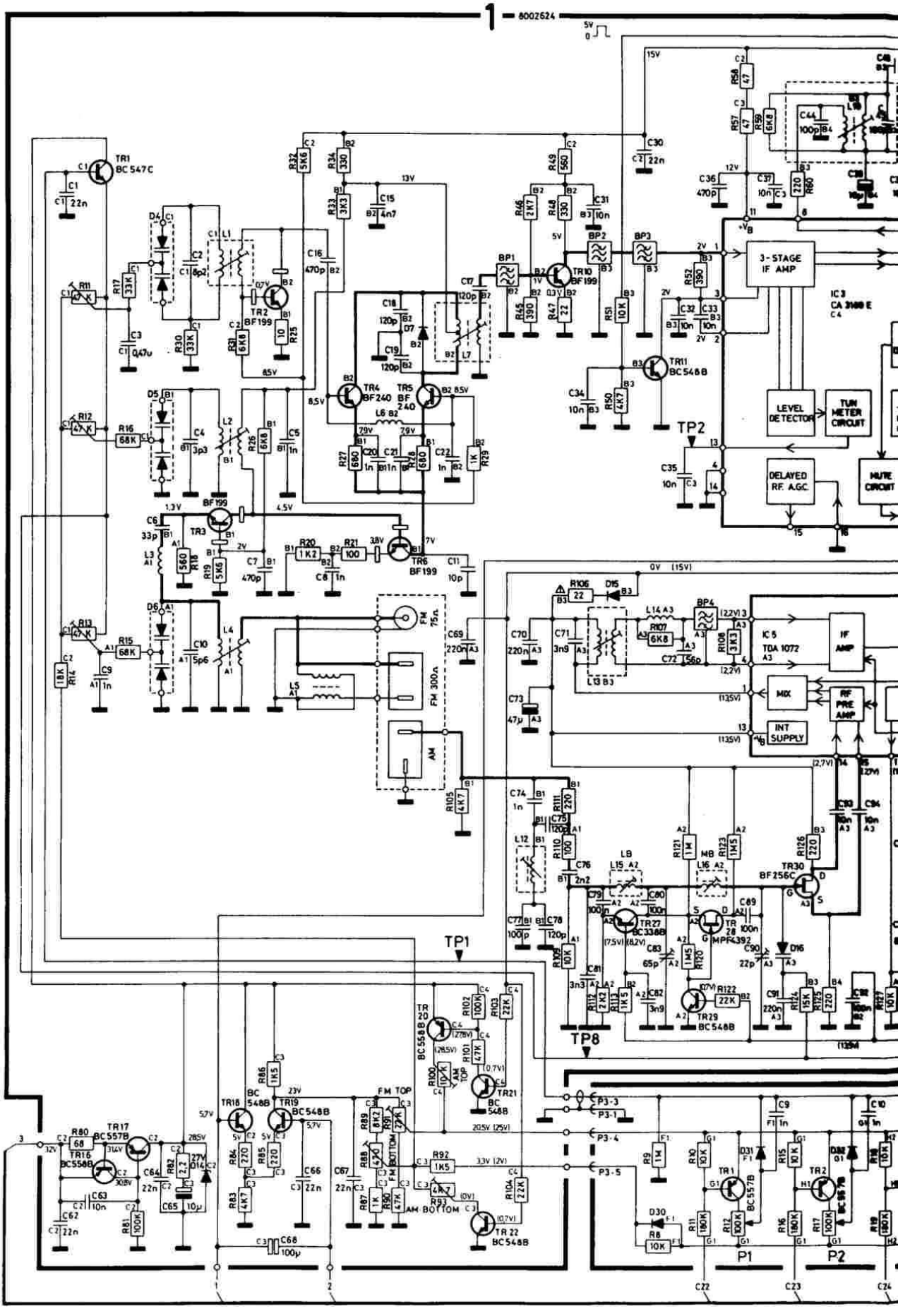
VOLUME STEP	VOLUME CONTROL 2IC6 (8048) OUTPUT 4	3	2	1	0	5IC2 (7445) INPUT D	C	B	A	OUTPUT PIN LOW	
0	0	0	0	0	0	1	1	1	1	×	
1	0	0	0	0	1	0	1	1	1	9	SD9 10
2	0	0	0	1	0						
3	0	0	0	1	1						
4	0	0	1	0	0	0	1	1	0	7	SD9 10 SD10 20
5	0	0	1	0	1						
6	0	0	1	1	0						
7	0	0	1	1	1						
8	0	1	0	0	0	0	1	0	1	6	SD9 10 SD10 20 SD11 30
9	0	1	0	0	1						
10	0	1	0	1	0						
11	0	1	0	1	1						
12	0	1	1	0	0	0	1	0	0	5	SD9 10 SD10 20 SD11 30 SD12 40
13	0	1	1	0	1						
14	0	1	1	1	0						
15	0	1	1	1	1						
16	1	0	0	0	0	0	0	1	1	4	SD9 10 SD10 20 SD11 30 SD12 40 SD13 50
17	1	0	0	0	1						
18	1	0	0	1	0						
19	1	0	0	1	1						
20	1	0	1	0	0	0	0	1	0	3	SD9 10 SD10 20 SD11 30 SD12 40 SD13 50 SD14 60
21	1	0	1	0	1						
22	1	0	1	1	0						
23	1	0	1	1	1						
24	1	1	0	0	0	0	0	0	1	2	SD9 10 SD10 20 SD11 30 SD12 40 SD13 50 SD14 60 SD15 70
25	1	1	0	0	1						
26	1	1	0	1	0						
27	1	1	0	1	1						
28	1	1	1	0	0	0	0	0	0	1	SD9 10 SD10 20 SD11 30 SD12 40 SD13 50 SD14 60 SD15 70 SD16 80
29	1	1	1	0	1						
30	1	1	1	1	0						



FUNCTION TABLE 3IC1 (7445) INPUTS D	C	B	A	FUNCTION	SW. pos.
0	0	0	0	PHONO	1
0	0	0	1	TAPE 1	2
0	0	1	0	TAPE 2	3
0	0	1	1	AM	4
0	1	0	0	P5	5
0	1	0	1	ST BY	6
0	1	1	0	P1	7
0	1	1	1	P2	9
1	0	0	0	P3	10

Bang&Olufsen 1-5

DIAGRAM A, type 2912/17 *Before serial no. 2930001*



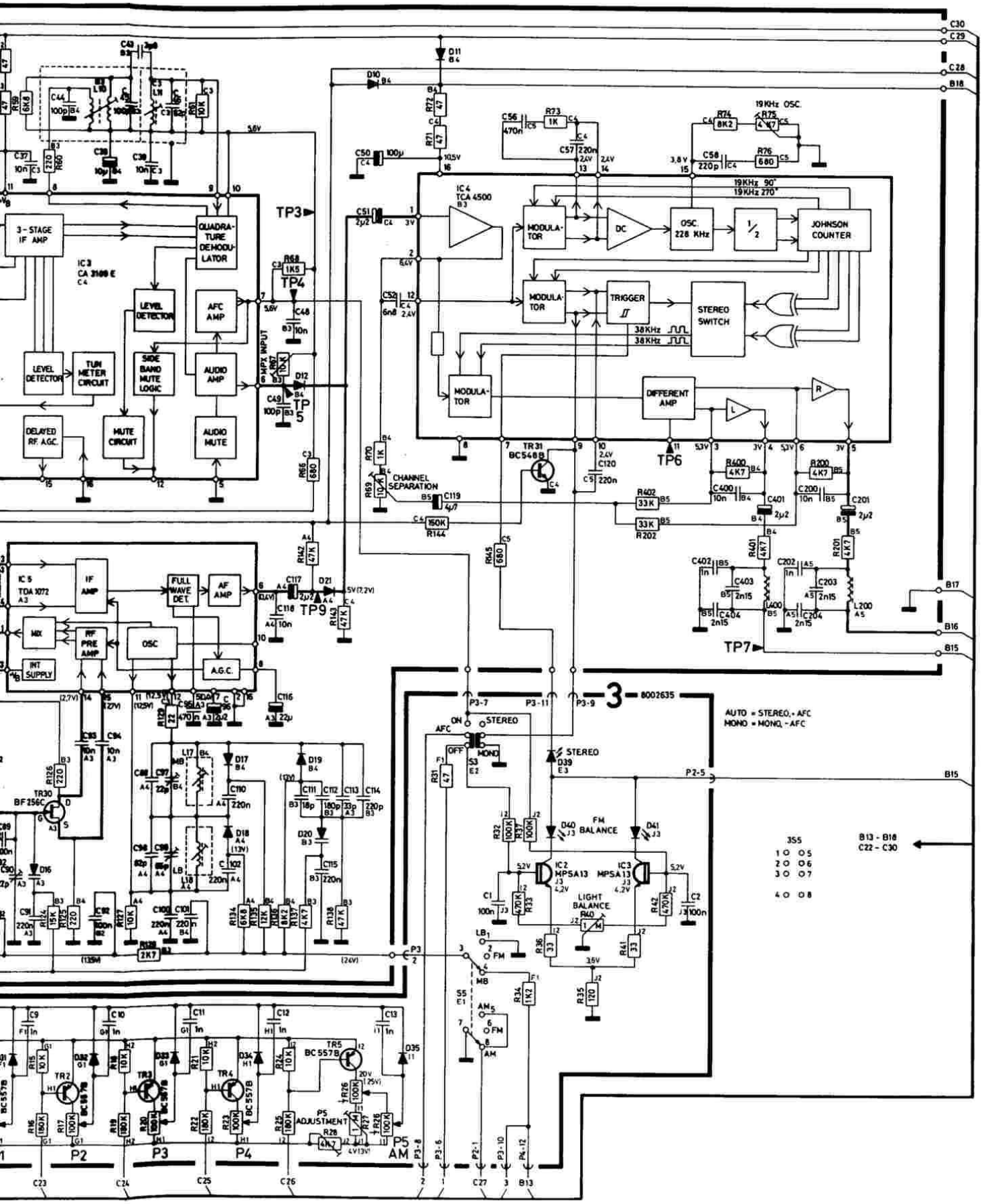
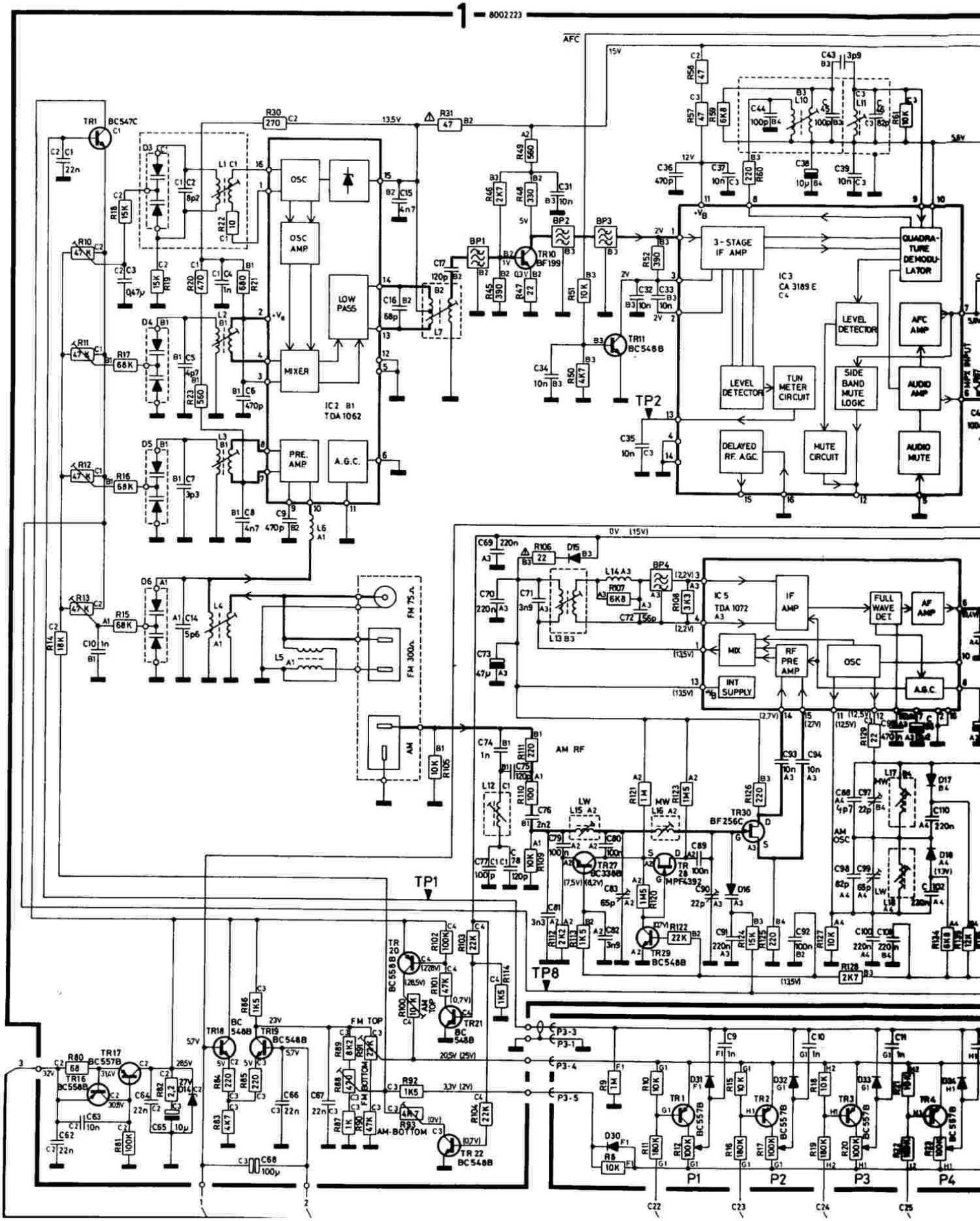
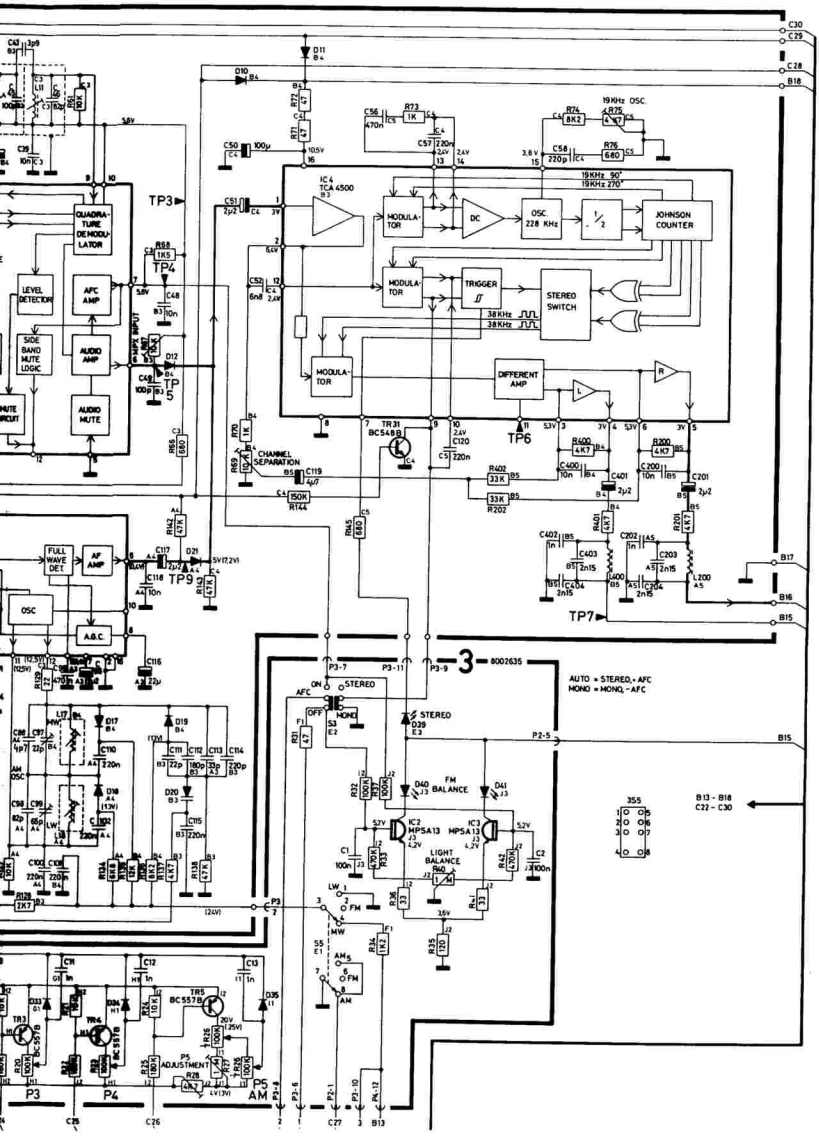

3 - STAGE IF AMP
QUADRATURE DEMODULATOR
IC3 CA 3189 E
LEVEL DETECTOR
AFC AMP
TUN METER CIRCUIT
SIDE BAND MUTE LOGIC
AUDIO AMP
DELAYED RF AGC.
MUTE CIRCUIT
AUDIO MUTE
MPX INPUT
TP3
TP4
TP5
IC4 TCA 4500
MODULATOR
DC
OSC. 228 KHz
1/2
JOHNSON COUNTER
19KHz OSC.
19KHz 90°
19KHz 270°
TRIGGER
STEREO SWITCH
38KHz
DIFFERENT AMP
CHANNEL SEPARATION
TR31 BC548B
TP6
TP7
IC5 TDA 1072
IF AMP
MIX
RF PRE AMP
OSC
INT SUPPLY
FULL WAVE DET.
AF AMP
A.G.C.
TP9
TR30 BF256C
P3-7
P3-11
P3-9
3 8002635
AUTO = STEREO, + AFC
MONO = MONO, - AFC
ON
AFC
OFF
MONO
STEREO
FM BALANCE
IC2 MPSA13
IC3 MPSA13
LIGHT BALANCE
FM
AM
P2-5
B13 - B18
C22 - C30
TR2
TR3
TR4
TR5 BC 557B
P5 ADJUSTMENT
P1
P2
P3
P4
P5 AM
C23
C24
C25
C26
C27
B13

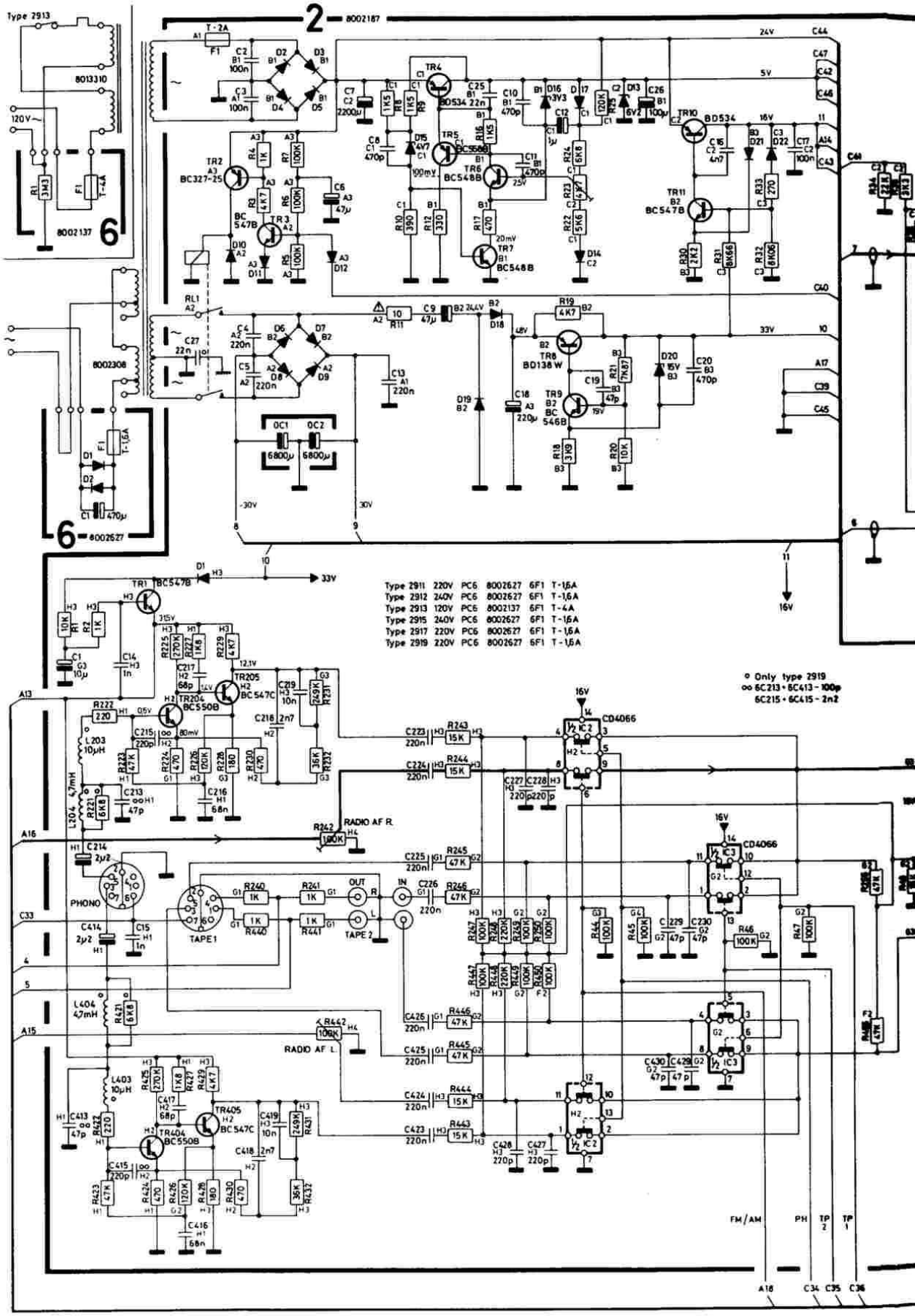
DIAGRAM A, type 2912/15/17 *From serial no. 2930001*

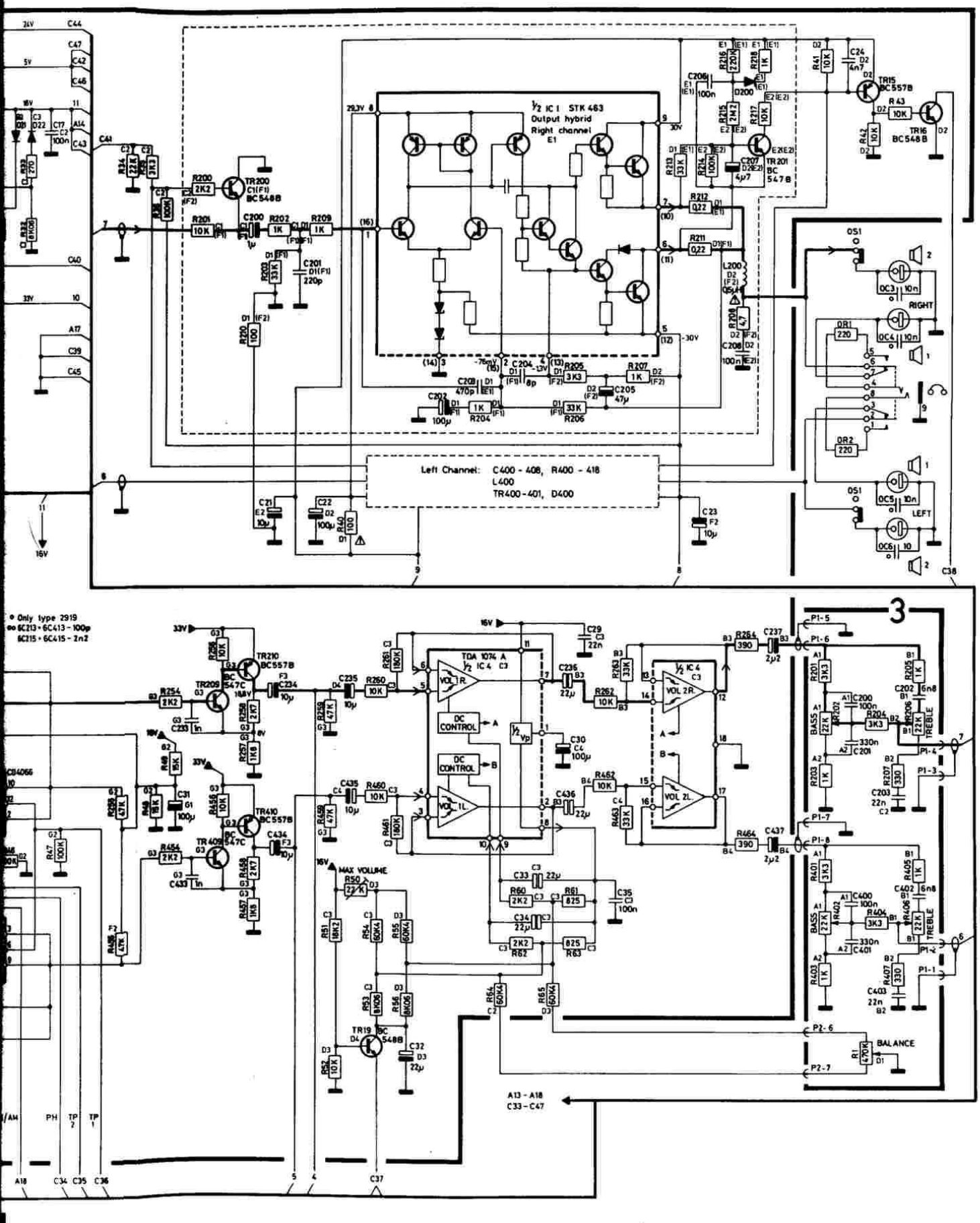



IC4 TCA 4500
MODULA-TOR
DC
OSC. 228 KHz
1/2
JOHNSON COUNTER
19KHz OSC.
19KHz 90°
19KHz 270°
TRIGGER
STEREO SWITCH
38KHz
38KHz
DIFFERENT AMP
QUADRA-TURE DEMODU-LATOR
LEVEL DETECTION
AFC AMP
AUDIO AMP
AUDIO MUTE
SIDE BAND MUTE LOGIC
CHANNEL SEPARATION
TR31 BC548B
FULL WAVE DET
AF AMP
OSC
A.G.C.
TP3
TP4
TP5
TP6
TP7
TP9
AUTO = STEREO + AFC
MONO = MONO - AFC
STEREO
MONO
OFF
AFC
FM BALANCE
LIGHT BALANCE
IC2 MPSA13
IC3 MPSA13
TR5 BC557B
TR3 BC557B
TR4 BC557B
ADJUSTMENT
AM
FM
MW
LW
P3
P4
P5
3 8002635
B13 - B18
C22 - C30

Bang&Olufsen

DIAGRAM B, all types




½ IC 1 STK 463
Output hybrid
Right channel
E1
Left Channel: C400 - 408, R400 - 418
L400
TR400 - 401, D400
TDA 1074 A
½ IC 4 C3
VOL 1R.
VOL 1L
VOL 2R.
VOL 2L
DC CONTROL
MAX VOLUME
BASS
TREBLE
BALANCE
RIGHT
LEFT
A13 - A18
C33 - C47
* Only type 2919
** 6C213 - 6C413 - 100p
6C215 - 6C415 - 2n2